

Pile Driving Questions and Answers Ten Mile Interchange Project

1. What is pile driving and why is it necessary?

Pile driving is a common method of constructing bridge foundations. To support the bridge, a steel pipe is driven into soft soil beneath the bridge foundation until it reaches a hard layer. On this project, the piles will be driven about 53 feet into the ground.

2. How are piles driven?

The piles are driven by a large hammer mounted on a crane.

3. How long will pile driving take?

The Idaho Transportation Department (ITD) anticipates this project will include four months of pile driving, spread over a six-month window (August to January). The number of piles per day will vary based on soil conditions. Typically, crews can drive three or more piles per day.

4. When is pile driving allowed?

Pile driving is restricted to daytime hours (7 a.m. to 9 p.m.). Typical work days will be Monday through Saturday, although the contractor could schedule shifts on a Sunday.

5. Where will pile driving take place?

Pile driving will occur in three locations on Ten Mile Road:

PILE DRIVING LOCATIONS	TENTATIVE SCHEDULE
Ten Mile Road and Tasa Drive <i>Where an undercrossing bridge will be built</i>	Aug. – Sept. 2009
Ten Mile Road and I-84 <i>Where the new interchange overpass will be built</i>	Sept. – Oct. 2009
Ten Mile Road, between Franklin Road and I-84 <i>Where an undercrossing will be built for a future local road</i>	Dec. 2009 – Jan. 2010

6. What is unique about this project that requires so much pile driving?

The soil conditions at this site require that the bridge foundations be supported with piles. The main interchange includes an overpass bridge that is wider than those typically seen in the area. This is to accommodate the “single point urban” design of the interchange, which provides for a more efficient movement of traffic.

The increased width requires more piles. In addition, this project includes two bridges over local roads, which also require piles.

ITD conducted tests in February 2008 to confirm the exact number of piles that would be needed to support the three bridges. There are 274 piles on the project. In contrast, the Orchard Interchange project in Boise will require 54 piles.

7. How noisy will the pile driving be?

The pile driver will emit a hammering noise while in operation. From 50 feet away, the noise level will range from 90 to 100 decibels – around the same noise level as a garbage truck or chain saw.

8. Is the pile-driving noise in compliance with city and county noise ordinances?

The noisiest activities have been limited to hours that will impact the least number of residents. There is uncertainty whether city and county ordinances apply to state right-of-way. ITD has worked with the City of Meridian to develop contract noise restrictions that comply with the intent of the noise ordinances.

9. Will there be vibration from the pile driving? Will it damage my home?

The hammering from pile driving may cause the ground to vibrate in the construction zone. The contractor will monitor vibration to ensure that no damage occurs.

10. What should I do if I have a complaint or question?

During business hours, please call Reed Hollinshead (334-8881) or June Sparks (334-8003) in the ITD Office of Communications with questions, complaints or comments. After business hours, please call 334-8005 to reach the ITD representative on call.

11. How will ITD keep us informed?

ITD is committed to keeping residents and business owners informed of pile driving and traffic impacts during construction.

- **E-mail:** Prior to pile driving or major traffic impacts, ITD distributes details to an e-mail database. To sign up, send your e-mail address to comments@itd.idaho.gov or call the ITD Office of Communications at 334-8005.
- **Web:** Current traffic information is posted to itd.idaho.gov. Click on Projects, Southwest Idaho and I-84, Ten Mile Interchange.
- **Twitter:** ITD sends general updates about I-84 construction in Nampa and Meridian. Sign up at www.twitter.com/IdahoITD.
- **Special arrangements:** If you are not able to access the Internet, ITD can make special arrangements to notify you of pile driving. Please call 334-8005 (TDD/TDY 334-4458).